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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/731,836	12/08/2003	Terry A. Todd	B-294	4419

7590 05/19/2006

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EXAMINER
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JOHNSON, EDWARD M

ART UNIT	PAPER NUMBER
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1754

DATE MAILED: 05/19/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

<b>Office Action Summary</b>	<b>Application No.</b> 10/731,836	<b>Applicant(s)</b> TODD ET AL.	
	<b>Examiner</b> Edward M. Johnson	<b>Art Unit</b> 1754	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

#### Status

- 1) ☒ Responsive to communication(s) filed on 18 April 2006.  
 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.  
 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

#### Disposition of Claims

- 4) ☒ Claim(s) 1-25 is/are pending in the application.  
 4a) Of the above claim(s) 18-25 is/are withdrawn from consideration.  
 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.  
 6) ☒ Claim(s) 1-17 is/are rejected.  
 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.  
 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

#### Application Papers

- 9) ☐ The specification is objected to by the Examiner.  
 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
 Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
 Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).  
 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

#### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  
 a) ☐ All b) ☐ Some \* c) ☐ None of:  
 1. ☐ Certified copies of the priority documents have been received.  
 2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.  
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

#### Attachment(s)

- |   |   |
|---|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892)  | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)  | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)             |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)<br>Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____  |

**DETAILED ACTION**

***Claim Rejections - 35 USC § 103***

1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

2. Claims 1-17 are rejected under 35 U.S.C. 103(a) as being unpatentable over Bleys et al. US 6,034,149.

Regarding claim 1, Bleys '149 discloses an absorbent comprising dispersed acrylonitrile (see column 3, lines 47-51) and triallyl methylammonium chloride (see column 5, lines 52-55).

Regarding claim 8, Bleys '149 discloses combining in solution (see Examples) dispersed acrylonitrile (see column 3, lines 47-51) and triallyl methylammonium chloride (see column 5, lines 52-55), mixing with water (see Example 1), and producing a dry foam (see column 7, lines 30-40).

With respect to claims 1 and 8, Bleys fails to disclose that the dispersion is homogenous.

It would have been obvious to one of ordinary skill in the art at the time the invention was made to disperse homogenously because an ordinary artisan would maximize the dispersal of the acrylonitrile as disclosed to achieve homogeneity.

Regarding claims 2-4, 9-11, and 17, Bleys '149 discloses triallyl methylammonium chloride crosslinker (see column 5, lines 52-55) and up to 5-10 per 100 parts per weight crosslinker (see column 4, lines 10-28), which would suggest up to 90-95 parts acrylonitrile.

Regarding claims 5 and 13, Bleys '149 discloses dispersed acrylonitrile particles (see column 3, lines 47-51) and forming a foam (see column 4, line 10), which would suggest a substantially homogenous and spherical shape to an ordinary artisan.

Regarding claims 6-7 and 14-15, a paper substrate would have been obvious to one of ordinary skill in the art because Bleys '149 discloses tampons (see column 1, lines 5-7).

Regarding claims 12 and 16, Bleys '149 discloses mixing with 70 pbw of water (Example 1).

3. The disclosure of "triallyl" is deemed to encompass or at least suggest the claimed "trialkyl" (see above). However, in view of Applicant's interpretation that it does not, the following additional ground of rejection is given:

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Claims 1-17 are rejected under 35 U.S.C. 103(a) as being unpatentable over Bleys et al. US 6,034,149 in view of Girot et al. US 5,906,734.

Regarding claims 1 and 8, Bleys '149 discloses an absorbent comprising dispersed acrylonitrile (see column 3, lines 47-51) and triallyl methylammonium chloride (see column 5, lines 52-55), mixing with water (see Example 1), and producing a dry foam (see column 7, lines 30-40).

With respect to claims 1 and 8, Bleys fails to disclose that the dispersion is homogenous and "trialkyl".

It would have been obvious to one of ordinary skill in the art at the time the invention was made to disperse homogeneously because an ordinary artisan would maximize the dispersal of the acrylonitrile as disclosed to achieve homogeneity.

Girot '734 discloses "trimethyl" ammonium chloride (see Examples 2 and 17).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to use the "trimethyl" of Girot as the "triallyl" group of the methylammonium chloride of Bleys because Bleys discloses "triallyl" methylammonium chloride in a sorbent and Girot discloses the trimethyl ammonium chloride for use in preparation of exchange resins for adsorbent applications (see Examples 2 and 17 and column 12, lines 4-19),

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which would obviously, to one of ordinary skill, suggest trimethyl methylammonium chloride.

Regarding claims 2-4, 9-11, and 17, Bleys '149 discloses triallyl methylammonium chloride crosslinker (see column 5, lines 52-55) and up to 5-10 per 100 parts per weight crosslinker (see column 4, lines 10-28), which would suggest up to 90-95 parts acrylonitrile.

Regarding claims 5 and 13, Bleys '149 discloses dispersed acrylonitrile particles (see column 3, lines 47-51) and forming a foam (see column 4, line 10), which would suggest a substantially homogenous and spherical shape to an ordinary artisan.

Regarding claims 6-7 and 14-15, a paper substrate would have been obvious to one of ordinary skill in the art because Bleys '149 discloses tampons (see column 1, lines 5-7).

Regarding claims 12 and 16, Bleys '149 discloses mixing with 70 pbw of water (Example 1).

#### ***Response to Arguments***

4. Applicant's arguments filed 4/7/06 have been fully considered but they are not persuasive.

It is argued that Applicants respectfully submit that Bleys does not teach... the referenced application. This is not persuasive because Applicant appears to admit that triallyl

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methyllummonium chloride is disclosed, which would at least suggest trialkylammonium compound to one of ordinary skill in the art at the time the invention was made. And, in any case, Applicant does not claim saturated trialkyl which contains only single bonds.

It is argued that furthermore, Bleys references a triallyl methyllummonium... in claim 1. This is not persuasive because Applicant does not claim saturated trialkyl which contains "only single bonds". In response to applicant's argument that the references fail to show certain features of applicant's invention, it is noted that the features upon which applicant relies (i.e., saturated trialkyl which contains "only single bonds") are not recited in the rejected claim(s). Although the claims are interpreted in light of the specification, limitations from the specification are not read into the claims. See *In re Van Geuns*, 988 F.2d 1181, 26 USPQ2d 1057 (Fed. Cir. 1993). And, in any case, "trialkyl" methyllummonium chloride would at least be suggested by the disclosed "triallyl" methyllummonium chloride, since, for example, Applicant appears to admit that both compounds contain the same elements, including "carbon-carbon" single bonds, which would obviously, to one of ordinary skill, at least suggest either trialkyl or triallyl.

It is argued that regarding the method of claim 8... triallyl methylammonium chloride. This is not persuasive for the reasons above.

It is argued that as such, a prima facie case of obviousness has not been established. This is not persuasive because Applicant appears to admit that "triallyl", which would at least suggest "trialkyl" to an ordinary artisan, since the same elements are present in the disclosed compound, possibly only differing in the presence of double bonds.

It is argued that regarding independent claims 5 and 13... homogenous and spherical shapes. This is not persuasive because Applicant merely claims "substantially" spherical shapes and it would have been within the purview of an ordinary artisan give a "particle" a substantially spherical shape having a diameter.

#### **Conclusion**

5. Applicant's submission of an information disclosure statement under 37 CFR 1.97(c) with the fee set forth in 37 CFR 1.17(p) on 4/18/06 prompted the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 609.04(b). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this



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action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

6. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Edward M. Johnson whose telephone number is 571-272-1352. The examiner can normally be reached on M-F 9:30-6:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Stanley S. Silverman can be reached on 571-272-1358. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).



Edward M. Johnson  
Primary Examiner  
Art Unit 1754

EMJ